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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/798,940	03/11/2004	Martin Letz	4965-000178	6898

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EXAMINER	
KOSLOW, CAROL M	

ART UNIT	PAPER NUMBER
1755	

DATE MAILED: 09/28/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/798,940	LETZ ET AL.	
	Examiner	Art Unit	
	C. Melissa Koslow	1755	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *24 July 2006*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-44* is/are pending in the application.

4a) Of the above claim(s) *18-22 and 37-43* is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-15,23-34 and 44* is/are rejected.

7)☒ Claim(s) *16,17,35 and 36* is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☒ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *11 March 2004* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☒ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892) (2 pgs)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date *3/11/04,6/25/2004,7/29/05*.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

Applicant's election of Group I, claims 1-17, 23-36 and 44 in the response of July 24 2006 is acknowledged. Because applicant did not distinctly and specifically point out the supposed errors in the restriction requirement, the election has been treated as an election without traverse (MPEP § 818.03(a)).

Claims 18-22 and 37-43 are withdrawn from further consideration pursuant to 37 CFR 1.142(b) as being drawn to a nonelected invention, there being no allowable generic or linking claim. Election was made **without** traverse.

The Japanese references cited in the information disclosure statement of 11 March 2004 have been considered with respect to the explanation of these references given in the specification.

The disclosure is objected to because of the following informalities: In paragraph [0024], "halide" is misspelled. Appropriate correction is required.

The specification is objected to as failing to provide proper antecedent basis for the claimed subject matter. See 37 CFR 1.75(d)(1) and MPEP § 608.01(o). Correction of the following is required: the subject matter of claims 2, 3, 16, 17, 29, 31, 32, 35 and 36 are not found in the specification. The amounts of the rare earth ions and the amount of the group selected from ZnO, alkali metal oxides and alkaline earth metal oxides in claim 1 are not found in the specification. The amounts of the rare earth ions and phosphorous oxide in claim 44 are not found in the specification. The specification does not clearly teach the "more than one" limitation of claims 10-12. Finally, the specification does not teach the "alkaline-earth silicate glass" of claim 24.

Claim 14 is objected to because of the following informalities: The "and" after "Tm" is missing. Appropriate correction is required.

Claims 8 and 9 are rejected under 35 U.S.C. 112, first paragraph, as containing subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

These claims teach up to 10% of the oxygen can be replaces by any anion different from oxygen which includes fluorine. Paragraph [0047] teaches up to 90% of oxygen is replaced by fluorine and up to 10% of the oxygen can be replaced by the other halides, which are not fluorine, and other anions. Thus this discrepancy needs to be corrected.

Claim 24 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

This claim lists a lanthanum oxide borate glass as a base glass of claim 23 which contains at most 1 wt% boron oxide, but lanthanum oxide borate glasses contain more than 1 wt% boron oxide, as shown by U.S. patent 3,254,031. Thus claim 24 includes a glass excluded from claim 23 and thus is indefinite.

A rejection based on double patenting of the "same invention" type finds its support in the language of 35 U.S.C. 101 which states that "whoever invents or discovers any new and useful process ... may obtain a patent therefor ..." (Emphasis added). Thus, the term "same invention," in this context, means an invention drawn to identical subject matter. See *Miller v. Eagle Mfg. Co.*, 151 U.S. 186 (1894); *In re Ockert*, 245 F.2d 467, 114 USPQ 330 (CCPA 1957); and *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970).

A statutory type (35 U.S.C. 101) double patenting rejection can be overcome by canceling or amending the conflicting claims so they are no longer coextensive in scope. The

filing of a terminal disclaimer cannot overcome a double patenting rejection based upon 35 U.S.C. 101.

Claims 23-33 are provisionally rejected under 35 U.S.C. 101 as claiming the same invention as that of claims 8-17 of copending Application No. 11/116,004. This is a provisional double patenting rejection since the conflicting claims have not in fact been patented.

The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

Claims 1-4, 7-12, 23 and 27-29 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-15 of U.S. Patent No. 6,853,659. Although the conflicting claims are not identical, they are not patentably distinct from each other because the claimed glass compositions overlap each other.

Claims 23, 25, 26, 28 and 29 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1, 7, and 13-18 of

copending Application No. 10/378,945. Although the conflicting claims are not identical, they are not patentably distinct from each other because the claimed glass compositions overlap each other.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

Claims 1-15 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-7 of copending Application No. 11/116,044. Although the conflicting claims are not identical, they are not patentably distinct from each other because the claimed glass compositions overlap each other.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

Claims 23, 25, 26, 28, 29 and 34 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-8 and 10-19 of copending Application No. 11/236,756. Although the conflicting claims are not identical, they are not patentably distinct from each other because the claimed glass compositions overlap each other.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 23, 25, 26, 28 and 29 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. patent 5,251,062.

This reference teaches TeO_2 glass consisting of up to 24 mol% of an alkali metal oxide and 10-30 mol% ZnO or n alkaline earth metal oxide. The glass is doped with 1 or 7 wt% of Er_2O_3, 1 wt% Pr_2O_3, 0.1 wt% Pr_2O_3 and 5.3 wt% Yb_2O_3 or 1 or 2 wt% Nd_2O_3. The taught glass is clearly free of water, nitrides and boron oxide. The reference teaches the claimed glass.

Claims 23, 25, 26, 28 and 29 are rejected under 35 U.S.C. 102(e) as being anticipated by U.S. patent 6,656,859.

This reference teaches a tellurite glass containing 0.005-10 wt% of a lanthanide oxide. The taught glass is clearly free of water, nitrides and boron oxide. The reference teaches the claimed glass.

Claims 23, 24 and 28-29 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. patent 3,374,381.

This reference teaches glasses that are free of boron oxide, water and nitrides that are doped with rare earth oxides. Table 1 teaches a soda-lime or crown glass comprising 0.25 wt% cerium oxide or 0.05 wt% samarium oxide; an alkali-alkaline earth silicate (Li-Mg-Al-Si) glass containing 0.25 wt% samarium oxide or dysprosium oxide; and an alkaline earth silicate glass (Mg-Al-Si) containing 0.85 wt% praseodymium oxide or 0.05 wt% europium oxide. The reference teaches the claimed glass.

Claims 23-26 and 28-29 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. patent 3,629,137.

This reference teaches lead silicate or flint glasses that are free of boron oxide, water and nitrides. The taught glass can also contain vanadium oxide. The glass is doped with 0.1-3 mol% Nd_2O_3, which when converted to weight percent, will fall within the claimed range, absent any showing to the contrary. The reference teaches the claimed glass.

Claims 23, 24 and 28-29 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. patent 3,654,172.

This reference teaches alkali metal-alkaline earth silicate or crown glasses that are free of boron oxide, water and nitrides. The glass contains 0.7-10 wt% terbium oxide. The reference teaches the claimed glass.

Claims 23-26 and 28-29 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. patent 3,677,960.

This reference teaches sodium-lime silicate, barium crown glass and alkali metal oxide-alkaline earth metal oxide silicate glasses containing 0.25-8 wt% Nd_2O_3. The taught glasses also contains at least one of titania, antimony oxide, molybdenum oxide, niobium oxide, tungsten oxide, bismuth oxide and tantalum oxide. The taught glass is clearly free of water, nitrides and boron oxide. The reference teaches the claimed glass.

Claims 1, 2, 5, 7, 10-13, 23, 25, 28 and 29 are rejected under 35 U.S.C. 102(b) as being anticipated by EP 709345.

Examples 1-3 and 7-21 teach glasses whose compositions fall within the claimed composition. Since the composition falls within that claimed, one of ordinary skill in the art

would expect the taught glass to have a color rendering index and a ΔC that falls within the claimed ranges, absent any showing to the contrary. The amount of the rare earth oxides in the taught glasses, which converted to weight percent, fall within the range of claim 23, absent any showing to the contrary. The taught glass is clearly free of water, nitrides and boron oxide. The reference teaches the claimed glasses.

Claims 1, 2, 23, 28 and 29 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. patent 4,075,120.

Example XVII teaches a glass whose compositions fall within the claimed composition. Since the composition falls within that claimed, one of ordinary skill in the art would expect the taught glass to have a color rendering index and a ΔC that falls within the claimed ranges, absent any showing to the contrary. The amount of the rare earth oxides in the taught glasses, which converted to weight percent, fall within the range of claim 23, absent any showing to the contrary. The taught glass is clearly free of water, nitrides and boron oxide. The reference teaches the claimed glass.

Claims 1-6, 23, 25, 26, 28, 29 and 44 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. patent 4,239,645.

The examples teach glasses whose compositions fall within the claimed composition. Since the compositions fall within that claimed, one of ordinary skill in the art would expect the taught glass to have a color rendering index and a ΔC that falls within the claimed ranges, absent any showing to the contrary. The amount of the rare earth oxides in the taught glasses, which converted to weight percent, fall within the range of claim 23, absent any showing to the

contrary. The taught glass is clearly free of water, nitrides and boron oxide. The reference teaches the claimed glasses.

Claims 1-6, 10, 23, 25, 26, 28, 29 and 44 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. patent 4,929,387; 5,032,315 or 5,526,369.

The examples teach glasses whose compositions fall within the claimed composition. Since the compositions fall within that claimed, one of ordinary skill in the art would expect the taught glass to have a color rendering index and a ΔC that falls within the claimed ranges, absent any showing to the contrary. The amount of the rare earth oxides in the taught glasses, which converted to weight percent, fall within the range of claim 23, absent any showing to the contrary. The taught glass is clearly free of water, nitrides and boron oxide. The reference teaches the claimed glasses.

Claims 1-6, 10, 11, 23, 28, 29 and 44 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. patent 5,334,559.

The example teaches a glass composition of 60 mol% phosphorous oxide, 13 mol% alumina, 24 mol% sodium oxide, 2.25 mol% lanthanum oxide and 0.75 mol% neodymium oxide. The total amount of lanthanide oxide in this glass is 3 mol% or 8.01 wt%. Since the compositions fall within that claimed, one of ordinary skill in the art would expect the taught glass to have a color rendering index and a ΔC that falls within the claimed ranges, absent any showing to the contrary. The taught glass is clearly free of water, nitrides and boron oxide. The reference teaches the claimed glasses.

Claims 1-6, 10, 23, 28, 29 and 44 are rejected under 35 U.S.C. 102(e and b) as being anticipated by U.S. patent 6,430,349.

The glass of example 1 falls within the claimed composition. Since the composition falls within that claimed, one of ordinary skill in the art would expect the taught glass to have a color rendering index and a ΔC that falls within the claimed ranges, absent any showing to the contrary. The amount of the rare earth oxides in the glasses in table 1, which converted to weight percent, fall within the range of claim 23, absent any showing to the contrary. The taught glass is clearly free of water, nitrides and boron oxide. The references teach the claimed glasses.

Claims 1-6, 10, 11, 13, 23, 28, 29 and 44 are rejected under 35 U.S.C. 102(e and b) as being anticipated by U.S. patent 4,134,851.

The reference teaches a glass consisting 25-36 mol% alumina, 64-75 mol% P_2O_5, 6-9 cation% Tb^{3+} and 0.5-1 cation% Ce^{3+} or a total of 3.25-5 mol% terbium oxide and Ce_2O_3. Since the composition falls within that claimed, one of ordinary skill in the art would expect the taught glass to have a color rendering index and a ΔC that falls within the claimed ranges, absent any showing to the contrary. The amount of the rare earth oxides in the glasses in table 1, which converted to weight percent, fall within the range of claim 23, absent any showing to the contrary. The taught glass is clearly free of water, nitrides and boron oxide. The references teach the claimed glasses.

Claims 1-12, 23, 28, 29 and 44 are rejected under 35 U.S.C. 102(e) as being anticipated by U.S. patent application publication 2004/0042515 or U.S. patent 6,853,659.

The applied reference has a common inventor and assignee with the instant application. Based upon the earlier effective U.S. filing date of the reference, it constitutes prior art under 35 U.S.C. 102(e). This rejection under 35 U.S.C. 102(e) might be overcome either by a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the reference was derived

from the inventor of this application and is thus not the invention "by another," or by an appropriate showing under 37 CFR 1.131.

Both of these references teach a luminescent phosphate glass containing 50-75 mol% P_2O_3, 3-15 mol% alumina, 2.5-35 mol% of at least one alkali metal oxide, 0-25 mol% of at least one alkaline earth oxide, up to 4 wt% of silica, refining agents and antisolarants (which the oxides in lines 7-8 of claim 1) and at least 8 mol% of neodymium oxide, ytterbium oxide and/or erbium oxide. The references teach that up to 90% of the oxygen in the glass can be replaced by fluorine. Table 1 teaches glass that fall within the claimed composition. Since the composition falls within that claimed, one of ordinary skill in the art would expect the taught glass to have a color rendering index and a ΔC that falls within the claimed ranges, absent any showing to the contrary. The amount of the rare earth oxides in the glasses in table 1, which converted to weight percent, fall within the range of claim 23, absent any showing to the contrary. The taught glass is clearly free of water, nitrides and boron oxide. The references teach the claimed glasses.

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claim 4 is rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. patent 4,134,851.

The reference teaches a glass consisting 25-36 mol% alumina, 64-75 mol% P_2O_5, 6-9 cation% Tb^{3+} and 0.5-1 cation% Ce^{3+} or a total of 3.25-5 mol% terbium oxide and Ce_2O_3. This amount of rare earth oxides overlaps the claimed range. Product claims with numerical ranges

which overlap prior art ranges were held to have been obvious under 35 USC 103. *In re Wertheim* 191 USPQ 90 (CCPA 1976); *In re Malagari* 182 USPQ 549 (CCPA 1974); *In re Fields* 134 USPQ 242 (CCPA 1962); *In re Nehrenberg* 126 USPQ 383 (CCPA 1960). Since the composition overlaps that claimed, one of ordinary skill in the art would expect the taught glass to have a color rendering index and a ΔC that overlaps the claimed ranges, absent any showing to the contrary. The reference suggests the claimed glass.

Claims 1, 2, 5, 7, 10-13, 23 and 27-29 are rejected under 35 U.S.C. 103(a) as being unpatentable over EP 709345.

These references teach glasses comprising 1-15 mol% phosphorous oxide, 1-18 mol% alumina, 0.5-21 mol% SrO, 0.5 mol% BaO, 0.8-8 mol% europium or terbium oxide, 4-55 mol% oxygen, 15-70 mol% fluorine, 0-12 mol% MgO, 0-18 mol% CaO, 0-3.5 mol% ZnO, 0-10 mol% alkali metal oxide, 0-0.2 mol% cerium oxide and 0-6.5 mol% of at least one of an oxide selected from yttrium, lanthanum, gadolinium and ytterbium. This composition overlaps the claimed range. Product claims with numerical ranges which overlap prior art ranges were held to have been obvious under 35 USC 103. *In re Wertheim* 191 USPQ 90 (CCPA 1976); *In re Malagari* 182 USPQ 549 (CCPA 1974); *In re Fields* 134 USPQ 242 (CCPA 1962); *In re Nehrenberg* 126 USPQ 383 (CCPA 1960). Since the composition overlaps that claimed, one of ordinary skill in the art would expect the taught glass to have a color rendering index and a ΔC that overlaps the claimed ranges, absent any showing to the contrary. The amount of the taught glasses, which when converted to weight percent, overlap the range of claims 23 and 27, absent any showing to the contrary. The reference suggests the claimed glass.

Claims 1-6, 23, 28, 29 and 44 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. patent 4,075,120

These references teach glasses consisting 35-65 mol% phosphorous oxide, 0.01-15 mol% alumina, 0.01-7 mol% Nd_2O_3, 5-30 mol% alkaline earth oxides and 5-40 mol% alkali metal oxide. This composition overlaps the claimed range. Product claims with numerical ranges which overlap prior art ranges were held to have been obvious under 35 USC 103. *In re Wertheim* 191 USPQ 90 (CCPA 1976); *In re Malagari* 182 USPQ 549 (CCPA 1974); *In re Fields* 134 USPQ 242 (CCPA 1962); *In re Nehrenberg* 126 USPQ 383 (CCPA 1960). Since the composition overlaps that claimed, one of ordinary skill in the art would expect the taught glass to have a color rendering index and a ΔC that overlaps the claimed ranges, absent any showing to the contrary. The amount of the taught glasses, which when converted to weight percent, overlap the range of claim 23, absent any showing to the contrary. The reference suggests the claimed glass.

Claims 1-6, 23, 25, 26, 28, 29 and 44 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. patent 4,239,645.

These references teach glasses comprising 55-70 mol% phosphorous oxide, 1-15 mol% alumina, 10-25 mol% alkali metal oxide, 5-15 mol% of at least one of ZnO, BaO, CaO, SrO and MgO and 0.01-5 mol% Nd_2O_3. This composition overlaps the claimed range. Product claims with numerical ranges which overlap prior art ranges were held to have been obvious under 35 USC 103. *In re Wertheim* 191 USPQ 90 (CCPA 1976); *In re Malagari* 182 USPQ 549 (CCPA 1974); *In re Fields* 134 USPQ 242 (CCPA 1962); *In re Nehrenberg* 126 USPQ 383 (CCPA 1960). Since the composition overlaps that claimed, one of ordinary skill in the art would expect the taught glass to have a color rendering index and a ΔC that overlaps the claimed ranges,

absent any showing to the contrary. The amount of the taught glasses, which when converted to weight percent, overlap the range of claim 23, absent any showing to the contrary. The taught glass can contain germanium oxide, niobium oxide or antimony oxide. The reference suggests the claimed glass.

Claims 1-6, 10-13, 23, 25, 26, 27, 28 and 44 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. patent 4,929,387; 5,032,315 or 5,526,369.

The taught glass compositions overlaps the claimed range. Product claims with numerical ranges which overlap prior art ranges were held to have been obvious under 35 USC 103. *In re Wertheim* 191 USPQ 90 (CCPA 1976); *In re Malagari* 182 USPQ 549 (CCPA 1974); *In re Fields* 134 USPQ 242 (CCPA 1962); *In re Nehrenberg* 126 USPQ 383 (CCPA 1960). Since the composition overlaps that claimed, one of ordinary skill in the art would expect the taught glass to have a color rendering index and a ΔC that overlaps the claimed ranges, absent any showing to the contrary. The amount of the taught glasses, which when converted to weight percent, overlap the range of claim 23, absent any showing to the contrary. The taught glass can contain niobium oxide. The reference suggests the claimed glass.

Claims 1-6, 10-13, 23, 27, 28 and 44 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. patent 5,334,559.

The taught glass compositions overlaps the claimed range. Product claims with numerical ranges which overlap prior art ranges were held to have been obvious under 35 USC 103. *In re Wertheim* 191 USPQ 90 (CCPA 1976); *In re Malagari* 182 USPQ 549 (CCPA 1974); *In re Fields* 134 USPQ 242 (CCPA 1962); *In re Nehrenberg* 126 USPQ 383 (CCPA 1960). Since the composition overlaps that claimed, one of ordinary skill in the art would expect the taught glass

to have a color rendering index and a ΔC that overlaps the claimed ranges, absent any showing to the contrary. The amount of the taught glasses, which when converted to weight percent, overlap the range of claim 23, absent any showing to the contrary. The reference suggests the claimed glass.

Claims 16, 17, 35 and 36 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

There is no teaching or suggestion in the cited art of record of a luminescent phosphor glass comprising phosphorous oxide, alumina, 0-50 mol% of at least one of ZnO, alkali metal oxide and alkaline earth oxide, up to 4 wt% of at least one of silica, zirconia, titania, niobium oxide, arsenic oxide and antimony oxide and more than 1 mol% of a mixture of praseodymium oxide and dysprosium oxide or a mixture of praseodymium oxide, dysprosium oxide, terbium oxide, europium oxide, Ce_2O_3 and thulium oxide. There is no teaching or suggestion in the cited art of record of a luminescent glass-ceramic having the composition of claims 35 and 36.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Melissa Koslow whose telephone number is (571) 272-1371. The examiner can normally be reached on Monday-Friday from 8:00 AM to 3:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jerry Lorengo, can be reached at (571) 272-1233.

The fax number for all official communications is (571) 273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

cmk
September 13, 2006

C. Melissa Koslow
Primary Examiner
Tech. Center 1700